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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/781,628	02/12/2001	Ursula Murschall	00/057 MFE	9521

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ProPat, L.L.C.  
2912 Crosby Road  
Charlotte, NC 28211

EXAMINER

CHEN, VIVIAN

ART UNIT	PAPER NUMBER
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1773

DATE MAILED: 01/30/2002

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Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/781,628

Applicant(s)

MURSCHALL ET AL.

Examiner

Vivian Chen

Art Unit

1773

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All   b) ☐ Some \*   c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 1, 4.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

Art Unit: 1773

## DETAILED ACTION

### *Double Patenting*

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

1. Claims 1-16 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claim 1-28 of copending Application No. 09/421,068, in view of in view of UK PATENT APPLICATION GB 2344596 (hereinafter GB '596) or BALOG ET AL (US 3,950,301).

Application 09/421,068 claims a white, biaxially oriented film comprising at least one layer comprising polyester and the specified cycloolefin, as well as other features such as the recited whiteness, opacity, and gloss values; and the presence of additional layers, etc. However, the reference does not explicitly disclose the recited UV stabilizer and flame retardant.

GB '596 discloses that it is well known in the art to incorporate a combination of 0.1-10 wt% of known UV stabilizers such as triazines or benzotriazoles and 0.1-45 wt% of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of masterbatch

Art Unit: 1773

technology (lines 3-4, page 9) in polyester films in order to obtain durable, weather-resistant sheets and laminates. BALOG ET AL discloses that it is well known in the art to incorporate a combination of 0.25-3 wt% of a hydroxybenzotriazole UV stabilizer and 0.5-50 parts by weight of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of masterbatch technology (lines 12-40, col. 7; line 53, col. 7 to line 23, col. 8; line 55, col. 9 to line 42, col. 10) in polyester films in order to obtain durable, weather-resistant sheets and laminates.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate conventional additives such as triazine or hydroxybenzotriazole UV stabilizers and organic phosphorus flame retardants into at least one layer of the white film claimed in Application No. 09/421,068 in order to improve durability, fire resistance, and color stability. One of ordinary skill in the art would have utilized conventional compounding methods such as masterbatches as indicated in claims 1-2 to incorporate the additives into the polyester composition. It would have been obvious to incorporate other fillers or pigments into the film in order to optimize the optical characteristics of the film as indicated in claims 1, 10, 14-16 in order to obtain the visual properties and physical properties required by a given application. It is conventional to incorporate UV stabilizers and flame retardants in the outside layers of a laminate as indicated in claim 11 in order to provide protection for the inner core layers. One of ordinary skill in the art would have used conventional functional intermediate layers such as an adhesive layer between two film layers in order to improve the interlayer adhesion as indicated in claim 12.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

*Claim Rejections - 35 USC § 103*

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over SASAKI ET AL (US 5,843,578), in view of REIDEL ET AL (US 5,869,586) or MINAMI ET AL (US 5,179,171) or KAJIURA ET AL (US 4,614,778), and in view of in view of UK PATENT APPLICATION GB 2344596 (hereinafter GB '596) or BALOG ET AL (US 3,950,301).

SASAKI ET AL discloses a biaxially oriented film comprising polyester and 3-40 wt% of an incompatible cyclic olefin resin (line 25, col. 4 to line 18, col. 5), wherein the film has good gloss, whiteness, and opacity (lines 51-56, col. 5; lines 18-24, col. 10) as recited in claims 1, 14-16, wherein the film may further contain pigments, stabilizers, and other additives for improved opacity (lines 19-33, col. 5), and may be further laminated and/or coated with a functional layer (lines 42-45, col. 9; line 65, col. 9 to line 12, col. 10) as recited in claims 10-12. However, the reference does not explicitly disclose the recited Tg values of the cycloolefin.

REIDEL ET AL discloses known cycloolefin polymers derived from norbornene, tetracyclododecene and/or cyclopentene (lines 25-50, col. 8) which have typical Tg values of 143 C to 193 C (Table) as recited in claims 1, 3-5, 14-16. MINAMI ET AL discloses known cycloolefin polymers derived from octahydronaphthalene-based monomers and optionally

Art Unit: 1773

norbornene and/or cyclopentene (columns 6-8; line 52, col. 10 to line 9, col. 11) which have Tg values of 10-200 C (lines 15-20, col. 13) as recited in claims 1, 3-5, 14-16. KAJIURA ET AL discloses known cycloolefin polymers derived from octahydronaphthalene-based monomers and optionally norbornene and/or cyclopentene (columns 4-6; 18-48, col. 10) which have Tg values of 30-220 C (lines 14-20, col. 8) as recited in claims 1, 3-5, 14-16.

GB '596 discloses that it is well known in the art to incorporate a combination of 0.1-10 wt% of known UV stabilizers such as triazines or benzotriazoles and 0.1-45 wt% of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of masterbatch technology (lines 3-4, page 9) in polyester films in order to obtain durable, weather-resistant sheets and laminates. BALOG ET AL discloses that it is well known in the art to incorporate a combination of 0.25-3 wt% of a hydroxybenzotriazole UV stabilizer and 0.5-50 parts by weight of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of masterbatch technology (lines 12-40, col. 7; line 53, col. 7 to line 23, col. 8; line 55, col. 9 to line 42, col. 10) in polyester films in order to obtain durable, weather-resistant sheets and laminates.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate known cycloolefin polymers as disclosed in REIDEL ET AL or MINAMI ET AL or KAJIURA ET AL in the polyester film of SASAKI ET AL in order to produce white films with useful mechanical and optical properties. It also would have been to incorporate conventional additives such as triazine or hydroxybenzotriazole UV stabilizers and organic phosphorus flame retardants into at least one layer of the white film claimed in Application No. 09/421,068 in order to improve durability, fire resistance, and color stability. One of ordinary skill in the art would have utilized conventional compounding methods such as

Art Unit: 1773

masterbatches as indicated in claims 1-2 to incorporate the additives into the polyester composition. It would have been obvious to use conventional film-finishing methods, additional pigments or additives, and/or additional surface layers or coatings in order to optimize the optical characteristics of the film as indicated in claims 1, 10, 14-16 in order to obtain the visual and physical properties required by a given application. It is conventional to incorporate UV stabilizers and flame retardants in the outside layers of a laminate as indicated in claim 11 in order to provide added protection for the inner core layers. One of ordinary skill in the art would have used conventional functional intermediate layers such as an adhesive layer between two film layers in order to improve the interlayer adhesion as indicated in claim 12.

4. Claims 1-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over JAPANESE PATENT APPLICATIONS 05-230253 or 05-009319 or 05-140349 or 11-035717 (hereinafter JP '253 and JP '319 and JP '349 and JP '717, respectively), in view of UK PATENT APPLICATION GB 2344596 (hereinafter GB '596) or BALOG ET AL (US 3,950,301).

JP '253 discloses a biaxially oriented film comprising polyester and 5-50 wt% of an incompatible cyclic olefin resin having a typical Tg of 129-134 C (Tables 1, 3), wherein the film has good gloss, whiteness, and opacity and wherein the film may further contain pigments, stabilizers, and other additives ([0028]) as recited in claim 1, 3-5, 10, 14-16, and may be further laminated and/or coated with additional layers ([0029]) as recited in claims 11-12.

JP '319 discloses a biaxially oriented film comprising polyester and 5-50 wt% of an incompatible cyclic olefin resin ([0010]) having a typical Tg of 98-100 C (Table 3), wherein the film has good gloss, whiteness, and opacity, and wherein the film may further contain pigments,

Art Unit: 1773

stabilizers, and other additives ([0030]) as recited in claims 1, 3-5, 10, 14-16, and may be further laminated and/or coated with additional layers ([0032]) as recited in claims 11-12.

JP '349 discloses a biaxially oriented film comprising polyester and 5-50 wt% of an incompatible cyclic olefin resin ([0009]) having a typical Tg of 135-205 C (Table 1), wherein the film has good gloss, whiteness, and opacity, and wherein the film may further contain pigments, stabilizers, and other additives ([0029]) as recited in claims 1, 3-5, 10, 14-16, and may be further laminated and/or coated with additional layers ([0031]) as recited in claims 11-12.

JP '717 discloses an opaque biaxially oriented film comprising polyester and 5-80 parts by weight of an incompatible cycloolefin resin having a typical Tg of 120-270 C (Abstract) wherein the film may further contain pigments, stabilizers, and other additives ([0061]) as recited in claims 1, 3-5, 10, 14-16, which may be further laminated and/or coated with additional layers ([0070]) as recited in claims 11-12.

However, the references do not explicitly disclose the specified UV stabilizers and flame retardants.

GB '596 discloses that it is well known in the art to incorporate a combination of 0.1-10 wt% of known UV stabilizers such as triazines or benzotriazoles and 0.1-45 wt% of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of masterbatch technology (lines 3-4, page 9) in polyester films in order to obtain durable, weather-resistant sheets and laminates. BALOG ET AL discloses that it is well known in the art to incorporate a combination of 0.25-3 wt% of a hydroxybenzotriazole UV stabilizer and 0.5-50 parts by weight of known flame retardants such as organic phosphorus compounds (pages 4-5) by means of



Art Unit: 1773

masterbatch technology (lines 12-40, col. 7; line 53, col. 7 to line 23, col. 8; line 55, col. 9 to line 42, col. 10) in polyester films in order to obtain durable, weather-resistant sheets and laminates.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to utilize the polyester/cycloolefin blends as disclosed in JP '253 and JP '319 and JP '349 and JP '717 as the base layer of a multilayer film in order to produce white films with useful mechanical and optical properties. It also would have been to incorporate conventional additives such as triazine or hydroxybenzotriazole UV stabilizers and organic phosphorus flame retardants into at least one layer of the white film claimed in Application No. 09/421,068 in order to improve durability, fire resistance, and color stability. One of ordinary skill in the art would have utilized conventional compounding methods such as masterbatches as indicated in claims 1-2 to incorporate the additives into the polyester composition. It would have been obvious to use conventional film-finishing methods, additional pigments or additives, and/or additional surface layers or coatings in order to optimize the optical characteristics of the film as indicated in claims 1, 10, 14-16 in order to obtain the visual and physical properties required by a given application. It is conventional to incorporate UV stabilizers and flame retardants in the outside layers of a laminate as indicated in claim 11 in order to provide added protection for the inner core layers. One of ordinary skill in the art would have used conventional functional intermediate layers such as an adhesive layer between two film layers in order to improve the interlayer adhesion as indicated in claim 12.

Art Unit: 1773


*Conclusion*

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Vivian Chen whose telephone number is (703) 305-3551. The examiner can normally be reached on Monday from 8:30 AM to 6 PM. The examiner can also be reached on alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Paul Thibodeau, can be reached on (703) 308-2367. The fax phone number for the organization where this application or proceeding is assigned is (703) 305-3601.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

January 25, 2002

  
Vivian Chen  
Primary Examiner  
Art Unit 1773